

Features

- Low forward voltage drop
- High reverse voltage
- Hermetic metal cases with ceramic insulators

 $I_{F(AV)}$ **3470 A** V_{RRM} **2100~3000 V** I_{FSM} **35 kA** I^2t **6125 $10^3 A^2S$** **Typical Applications**

- All purpose high power rectifier diodes
- High power resistance welding equipment
- Non-controllable and half-controllable rectifiers
- Controlled rectifiers



SYMBOL	CHARACTERISTIC	TEST CONDITIONS	$T_j(^\circ C)$	VALUE			UNIT
				Min	Type	Max	
$I_{F(AV)}$	Mean forward current	180° half sine wave 50Hz Double side cooled,	$T_c=85^\circ C$	160		3470	A
V_{RRM}	Repetitive peak reverse voltage	tp=10ms	160	2100		3000	V
I_{RRM}	Repetitive peak current	At V_{RRM}	160			160	mA
I_{FSM}	Surge forward current	10ms half sine wave $V_R=0.6V_{RRM}$	160			35	kA
I^2t	I^2t for fusing coordination					6125	$A^2s \cdot 10^3$
V_{FO}	Threshold voltage		160			0.95	V
r_F	Forward slope resistance					0.10	$m\Omega$
V_{FM}	Peak forward voltage	$I_{FM}=5000A, F=40kN$	160			1.45	V
Q_{rr}	Recovery charge	$I_{FM}=2000A, tp=2000\mu s, di/dt=-20A/\mu s, V_R=50V$	160	5500			μC
$R_{th(j-c)}$	Thermal resistance Junction to case	DC double side cooled Clamping force 40kN				0.012	$^\circ C / W$
$R_{th(c-h)}$	Thermal resistance case to heat sink					0.003	
F_m	Mounting force			30		40	kN
T_{stg}	Stored temperature			-40		160	$^\circ C$
W_t	Weight					880	g
Outline		P44					

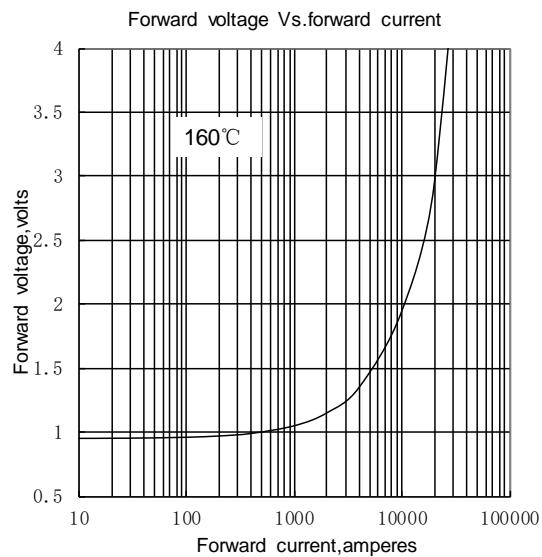


Fig.1

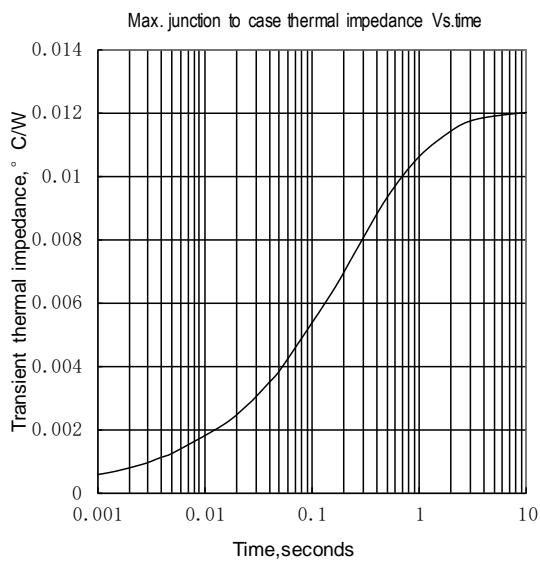


Fig.2

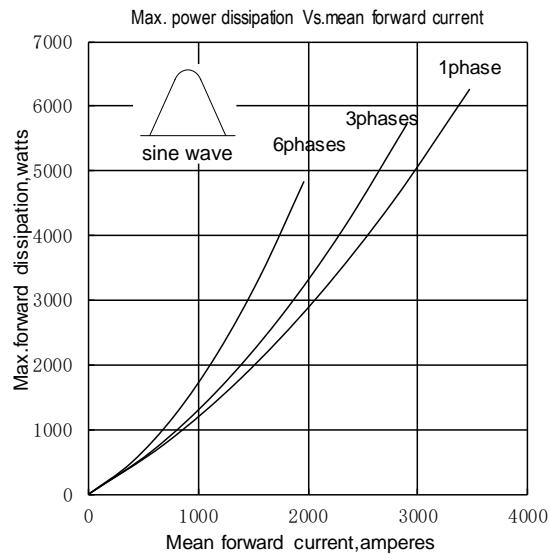


Fig.3

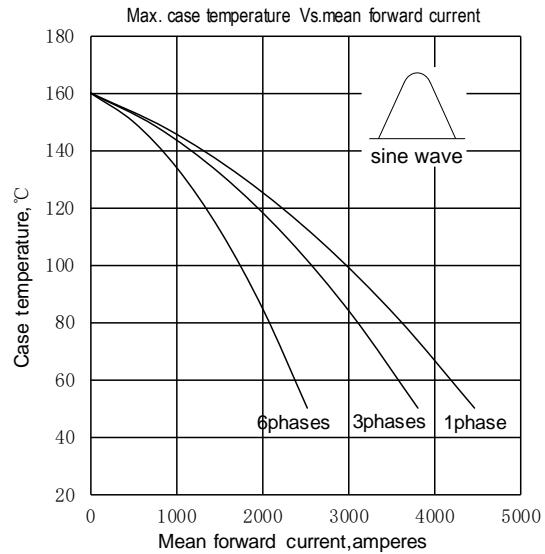


Fig.4

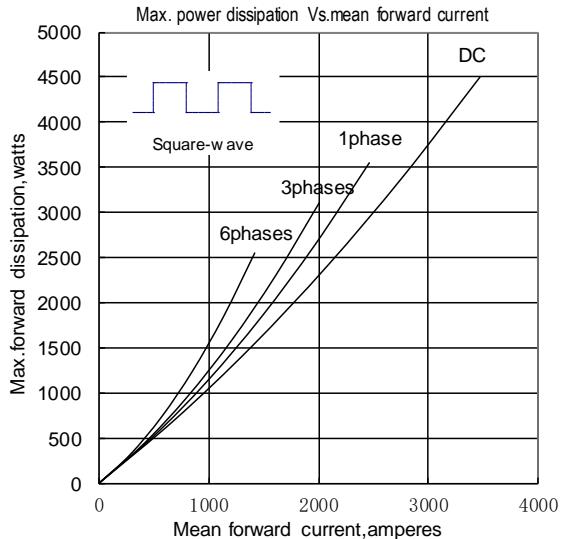


Fig.5

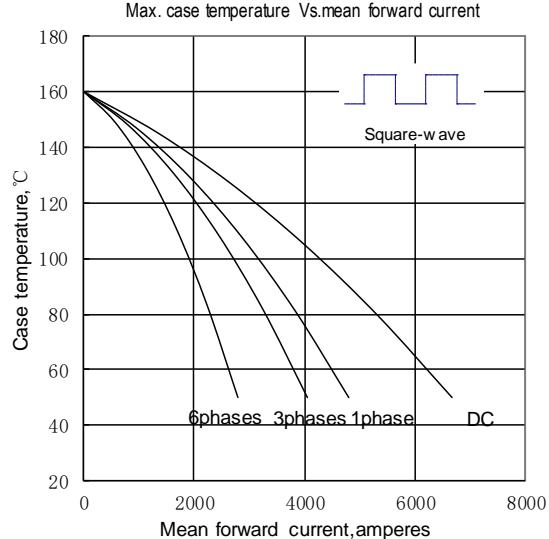


Fig.6

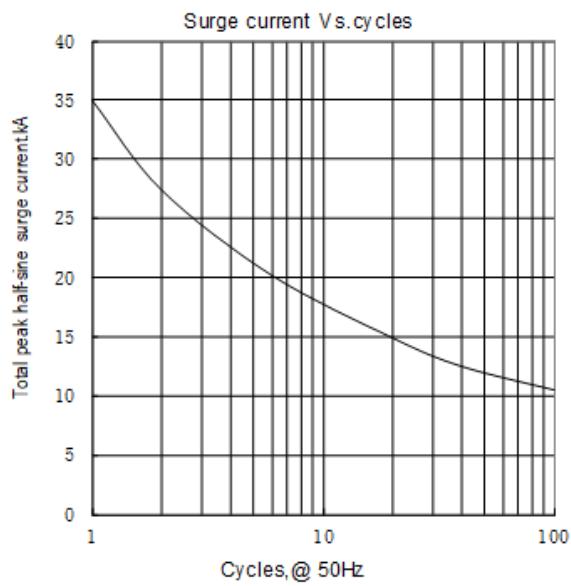
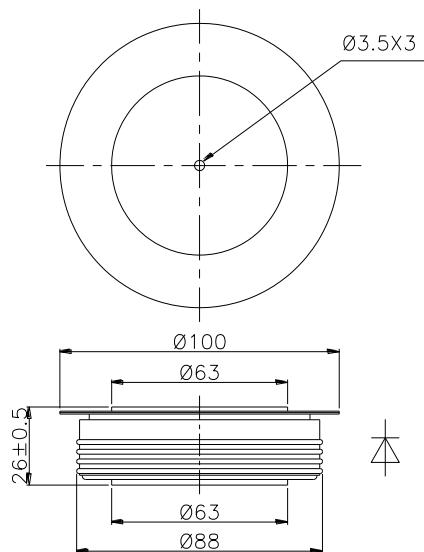


Fig.7



Nlps reserves the right to change specifications without notice.